Manitoba Monthly Communicable Disease Report

Reported up to April 30, 2009

Highlights:

1. **Antimicrobial Resistant Organisms**
   Together Methicillin-resistant *Staphylococcus aureus* (MRSA) and *Clostridium difficile* (*C. difficile*) accounted for 58% of all non-STI/HIV related communicable diseases reported to Manitoba Health and Healthy Living during April 2009.

2. **Sexually Transmitted Infections (STI) & Blood-Borne Pathogens (BBP)**
   There were 613 reported cases of sexually transmitted infections (chlamydia, gonorrhoea, and syphilis) in April 2009:
   - 512 reported cases of chlamydia (Ct) only
   - 53 reported cases of gonorrhoea (GC) only
   - 46 reported co-infections of Ct and GC and
   - 2 reported cases of syphilis

   Chlamydia has the highest incidence of reported STI. Females between the ages of 15 and 24 years comprised 51% of all reported chlamydia cases in the province.

   In April 2009, there were no cases of Hepatitis B virus (HBV), 27 cases of Hepatitis C virus (HCV) and 11 cases of HIV newly reported in Manitoba.

3. **Other Communicable Diseases**

The number of reported cases in April 2009 was within the statistically expected range for these reported communicable diseases with the exception of the following diseases:

- Pertussis – 12 positive lab confirmed cases reported; less than eight expected in an average month

The expected number of cases and range is statistically based on the number of reported cases during March, April and May, 2004-2009.

Explanatory Notes:

General:

Each monthly communicable disease report includes the number of cases of notifiable communicable diseases reported by lab or health provider during each individual month. Data for the monthly summary are aggregated based on the earliest of: symptom onset date, specimen collection date, or report date. For the majority of cases, the date used will be the specimen collection date. Some discrepancy of numbers may be based on reporting delays.

The observed numbers of cases are compared to the statistically expected range for each reportable communicable disease. This involves comparing the current month's case counts to the average case counts for the same month, one month subsequent and one month prior for the previous five years. These same months over the five years are used to determine the expected range of cases using the statistical calculation of standard deviation. Using this specific monthly pattern allows for adjustment within the statistics for both seasonality and cyclical disease patterns.

The year-to-date case counts are based on the calendar year.

The disease data reported in the monthly report has not been analyzed for severity or associated deaths at this time.

Disease specific information:

Methicillin-resistant *Staphylococcus aureus* (MRSA) positive results within Manitoba include both individuals who are symptomatic of infection and colonized individuals who have no symptoms and are mostly diagnosed during admission screening activities at facilities. If facilities increase their screening activities, it would usually result in a rise in colonized MRSA cases.

A new case of Hepatitis C Virus (HCV) infection is defined as a first positive test for an identifiable individual.

A new case of Human Immunodeficiency Virus (HIV) infection is defined as a positive test with a unique code that has not been previously linked to a positive test result in Manitoba. Positive HIV tests included in this month's statistics include both nominal and non-nominal testing results.

SUMMARY OF COMMUNICABLE DISEASE FOR April 2009

		MONTHLY TOTAL				YEAR-TO-DATE	
ICD9	DISEASE/INFECTION	2008	2009	Expected*	Ex. Range**	2008	2009
006.9	AMEBIASIS	3	4	3	0-8	15	10
022	ANTHRAX				***		
127.0	ASCARIASIS			0	0-0		
005.8	B. CEREUS			0	0-1		1
320.1	BAC. MENINGITIS - PNEUM			0	0-1		1
320.7	BAC.MENINGITIS-LISTERIA				***		
038.0	BETA STREP SEPTICEMIA	7	14		***	35	48
116.0	BLASTOMYCOSIS	1			***	3	2
005.1	BOTULISM				***		
023	BRUCELLOSIS			0	0-0		
005.2	C. PERFRINGENS			0	0-2		
008.43	CAMPYLOBACTER	12	24	17	4-30	58	68
558.2	CLOSTRIDIUM DIFFICILE	80	70		***	296	290
046.1	CREUTZFELD-JACOB DISEASE				***		1
007.8	CRYPTOSPORIDIOSIS	1	3	2	0-5	5	9
061.0	DENGUE FEVER			0	0-1	1	
065.4	DENGUE HEMORRHAGIC FEVER			0	0-0		
V02.4	DIPH.CARRIERS	3		0	0-2	3	1
032	DIPHTHERIA CASES			0	0-0	1	
123.4	DIPHYLLOBOTHRIUM SPP			0	0-1	1	1
008.0	E. COLI-VEROTOXIGENIC	3	1	4	0-9	12	13
054.3	ENCEPHALITIS			0	0-0		
005.9	FOOD POISONING OTHER			0	0-0		
007.1	GIARDIA LAMBLIA	8	8	9	5-13	31	31
320.0	H.INFLUENZAE (CSF)			0	0-0		
041.5	H.INFLUENZAE (OTHER STERILE)		2	0	0-2	1	2
041.59	HAEM. INFLUENZAE (non-B)	2			***	6	1
480.8	HANTA VIRUS			0	0-1		
283.11	HEMOLYTIC UREMIC SYNDROME			0	0-1		
070.1	HEPATITIS A	2	2	1	0-3	5	6
070.3	HEPATITIS B	1		1	0-3	2	1
070.51	HEPATITIS C	32	27	33	16-50	124	130
487.1A	INFLUENZA A	6	19		***	78	56
487.1B	INFLUENZA B	10	4		***	38	37
482.83	LEGIONELLA			0	0-1		
085.9	LEISHMANIASIS			0	0-0		
030.9	LEPROSY			0	0-1		
027.0	LISTERIA MONOCYTOGENES			0	0-1	2	
088.81	LYME DISEASE			0	0-0		
084	MALARIA			1	0-4	4	5
055.9	MEASLES			0	0-0		
036.0	MENINGOCOCCAL CSF			0	0-1	1	
036.82	MENINGOCOCCAL ARTHROPATHY				***		
036.2	MENINGOCOCCEMIA BLOOD			0	0-1	2	
B95.6	MRSA	174	179	108	20-196	673	741
072.9	MUMPS			0	0-2		3
036.89	N.MENINGITIDIS OTHER			0	0-0		4
728.86	NECROTIZING FASCIITIS			1	0-3	2	3
729.1	NECROTIZING MYOSITIS				***		
323.9	OTHER ENCEPHALITIS			0	0-0		
033.1	PARAPERTUSSIS				***		
033.0	PERTUSSIS		12	2	0-7	7	13
038.2	PNEUM. SEPTICEMIA	12	10	9	1-17	42	36
073.9	PSITTACOSIS			0	0-0		

* Mean of 15 month totals, from previous, comparable and subsequent months for the past 5 years

** Mean +/- 2 standard deviations of mean

*** Data collected for less than 5 years.

		MONTHLY TOTAL				YEAR-TO-DATE	
ICD9	DISEASE/INFECTION	2008	2009	Expected*	Ex. Range**	2008	2009
083.0	Q FEVER			0	0-0	1	1
056.9	RUBELLA			0	0-1		
771.0	RUBELLA CONGENTIAL			0	0-0		
041.2	S.PNEUM.OTHER			1	0-4	1	3
003.0	SALMONELLA	23	18	16	4-28	92	66
120	SCHISTOSOMIASIS			0	0-0		
004	SHIGELLOSIS	2	2	1	0-3	10	13
050.9	SMALLPOX				***		
005.0	STAPH FOOD POISON			0	0-0		
785.5	STAPH TOXIC SHOCK		1		***	2	1
481.9	STREP PNEUMONIA - PR			0	0-0		
041.1	STREP PYOGENES - OTHER STER	2	7		***	12	31
711.0	STREP.PNEUM.ARTHRITIS			0	0-1		
580.0	STREPT GLOMERULONEPHRITIS			0	0-0		
040.89	STREPT TOXIC SHOCK			0	0-1		
481	STREPTOCOCCUS PNEUMONIAE			0	0-2	2	
127.2	STRONGYLOIDES	1		1	0-5	1	4
037	TETANUS			0	0-0		
130.9	TOXOPLASMOSIS			0	0-0		
124	TRICHINOSIS			0	0-0		
086	TRYPANOSOMA CRUZI			0	0-0		
013	TUBERCULOSIS - NON-RESP.	1		2	1-5	5	7
010	TUBERCULOSIS - PRIM.	1	4	3	1-9	1	5
011	TUBERCULOSIS - RESP.	7	11	10	6-17	24	32
021.9	TULAREMIA			0	0-1		
002.0	TYPHOID	1		0	0-1	1	1
081.9	TYPHUS			0	0-0		
B96.8	VANCOMYCIN R. ENTEROCOCCI	9	4		***	25	19
005.4	VIBRIO PARAHAEMOLYTICUS				***		
070.59	VIRAL HEP. OTHER				***		
B95.7	VRSA			0	0-0		
062.1	W. EQUINE ENCEPHALITIS			0	0-0		
066.41	WNV NEUROLOGICAL SYNDROME				***		
008.44	YERSINIA ENTEROCOLITICA		1	1	0-3		1
		404	**427**			**1625**	**1698**

* Mean of 15 month totals, from previous, comparable and subsequent months for the past 5 years

** Mean +/- 2 standard deviations of mean

*** Data collected for less than 5 years.

SUMMARY OF COMMUNICABLE DISEASE BY AGE AND GENDER FOR April 2009

		<1		1 - 4		5 - 9		10 - 14		15 - 19		20 - 24		25 - 29		30 - 39		40 - 49		50 - 59		60 - 69		70 - 79		80 +		Missing	Total
ICD9	Disease Name	F	M	F	M	F	M	F	M	F	M	F	M	F	M	F	M	F	M	F	M	F	M	F	M	F	M	age/gendr	
006.9	AMEBIASIS						1			1			1				1												4
038.0	BETA STREP SEPTICEMIA	1	1										1	2	1			1	1	1	2	1			1		1		14
008.43	CAMPYLOBACTER	1		3	1	1	1			1	4		1	2	1		3					2	2		1				24
558.2	CLOSTRIDIUM DIFFICILE		1		2	3	1	1			1	1	2		1	4	1	5	2	3	5	7	4	5	5	11	5		70
007.6	CRYPTOSPORIDIOSIS						1			1								1											3
008.0	E. COLI 0157																			1									1
007.1	GIARDIA LAMBLIA				1	1	1	1					1				1		1		1								8
041.5	H.INFLUENZAE (OTHER STER	1							1																				2
070.1	HEPATITIS A														1				1										2
070.51	HEPATITIS C													2	2	4	5	2	3	1	3	2	1		2				27
487.1A	INFLUENZA A	2		1	1		1	1		1										2			1		1	5	3		19
487.1B	INFLUENZA B	1	1				1											1											4
B95.6	MRSA	4	7	8	6	6	6	4	3	6	3	7	5	4	6	13	6	9	11	12	8	8	11	2	12	1	11		179
033.0	PERTUSSIS	1	1		3	1			1	2				1	1											1			12
038.2	PNEUM. SEPTICEMIA															1	1		1		2	1	1		1	2			10
003.0	SALMONELLA		1		1		1					1					2	1	2	3	3	2					1		18
004	SHIGELLOSIS								1														1						2
785.5	STAPHYLOCOCCUS AUREUS			1																									1
041.1	STREP PYOGENES - OTHER ST	1		1					1									1	1		1		1						7
010	TUBERCULOSIS - PRIM			1	1	1			1																				4
011	TUBERCULOSIS - RESP										1	1			1	3	1	1				1			1		1		11
B96.8	VANCOMYCIN RES. ENTER.																1	1	1					1					4
008.44	YERSINIA ENTEROCOLITICA																			1									1
		12	12	15	16	13	14	7	8	12	9	10	11	11	14	25	22	23	24	24	25	24	22	8	24	20	22		427

SUMMARY OF COMMUNICABLE DISEASE BY REGION (RHA) FOR April 2009

ICD9	Disease/Infection	Winnipeg	Brandon	N.Eastman		S.Eastman		Interlake		Central		Assiniboine		Parkland		Norman		Burntwood		Churchill	OOP	Missing	TOTAL
*Case Referred to:**				*F*	*P*	*F*	*P*	*F*	*P*	*F*	*P*	*F*	*P*	*F*	*P*	*F*	*P*	*F*	*P*				
006.9	AMEBIASIS	3					1																4
038.0	BETA STREP SEPTICEMIA	6	1		1				2		2							2					14
008.43	CAMPYLOBACTER	8	2				3		3		4		1	1	2								24
558.2	CLOSTRIDIUM DIFFICILE	43	5		1		2		3		2		7		4		1		2				70
007.8	CRYPTOSPORIDIOSIS	1							1				1										3
008.0	E. COLI 0157																	1					1
007.1	GIARDIA LAMBLIA	5	1								1				1								8
041.5	H.INFLUENZAE (OTHER STE	2																					2
070.1	HEPATITIS A	2																					2
070.51	HEPATITIS C	14	1		1		1	1	5		1		1		1				1				27
487.1A	INFLUENZA A	13	1						1				1						2		1		19
487.1B	INFLUENZA B										3									1			4
B95.6	MRSA	67	1	1	3		1	1	9		6		4		6	1	9	47	21	1		1	179
033.0	PERTUSSIS	1					1						10										12
038.2	PNEUM. SEPTICEMIA	6									1							3					10
003.0	SALMONELLA	10	1				2						2		1		1	1					18
004	SHIGELLOSIS	1											1										2
785.5	STAPHYLOCOCCUS AUREUS												1										1
041.1	STREP PYOGENES - OTHER ST	5									1		1										7
010	TUBERCULOSIS - PRIM			3														1					4
011	TUBERCULOSIS - RESP	5		2					1									2	1				11
B96.8	VANCOMYCIN RES. ENTER.	2					1											1					4
008.44	YERSINIA ENTEROCOLITICA		1																				1
		194	**14**	**6**	**6**		**12**	**2**	**25**		**21**		**30**	**1**	**15**	**1**	**11**	**58**	**27**	**2**	**1**	**1**	**427**

* F=Federal Jurisdiction (First Nations and Inuit Health) P=Provincial Jurisdiction

STD Infection Summary Report - April 2009

	MONTHLY TOTAL		YEAR-TO-DATE	
DISEASE/INFECTION	**2008**	**2009**	**2008**	**2009**
All Chlamydia Infections	610	558	2382	2334
All Gonorrhea Infections (including PRNG)	155	99	525	444
All Syphilis Infections	2	2	11	17
Gonorrhea & Chlamydia Co-infections	61	46	238	201
HIV	10	11	27	41

Total Number of STD Cases by Age and Gender - April 2009

	<1		1 - 4		5 - 9		10 - 14		15 - 19		20 - 24		25 - 29		30 - 39		40 - 49		50 - 59		60 - 69		70 - 79		80 +		Missing	Total
Disease Name	F	M	F	M	F	M	F	M	F	M	F	M	F	M	F	M	F	M	F	M	F	M	F	M	F	M	age/gendr	
Chlamydia Only Cases						1	6	1	153	38	107	65	39	28	32	21	8	4	4	3	2							512
Gonorrhea Only Cases									4	1	10	3	4	10	6	8	4	1		1		1						53
Syphilis Only Cases																		1						1				2
GC and CT Cases								1	14	7	10	6	2	4	1	1												46
						1	6	2	171	46	127	74	45	42	39	30	12	6	4	4	2	1		1				613
HIV															5	1		2		1		1		1				11

Regional STD Distribution - April 2009

Disease/Infection	**Winnipeg**	**Brandon**	**N.Eastman**		**S.Eastman**		**Interlake**		**Central**		**Assiniboine**		**Parkland**		**Norman**		**Burntwood**		**Churchill**	**OOP**	**Missing**	**TOTAL**
Case Referred to:*			*F*	*P*	*F*	*P*	*F*	*P*	*F*	*P*	*F*	*P*	*F*	*P*	*F*	*P*	*F*	*P*				
All Chlamydia Infections	267	11	14	8		9	7	16		27		30	9	15	4	16	83	38		3	1	558
All Gonorrhea Infections	44		6	1	1	1	3			4		3	2			4	16	13		1		99
All Syphilis Infections	2																					2
GC and CT Infections	15		4			1	2			3		1	1			1	12	6				46

* F=Federal Jurisdiction (includes First Nations and Inuit Health) P=Provincial Jurisdiction